What is claimed is:

1. A single-vision astigmatic-power spectacle lens having a cylindrical power to correct astigmatism of an eye comprising:

a front surface; and

a back surface,

wherein at least one of said front and back surfaces is a rotationally-asymmetrical aspherical surface that has a rotationally-asymmetrical component to correct the aberrations in the directions between first and second principal meridians caused by adding said cylindrical power.

2. The single-vision astigmatic-power spectacle lens according to claim 1, wherein said rotationally-asymmetrical aspherical surface further includes another rotationally-asymmetrical component to add said cylindrical power for correcting astigmatism of an eye.

3. The single-vision astigmatic-power spectacle lens according to claim 1, wherein said front surface is spherical and said back surface is rotationally-asymmetrical.

4. A single-vision astigmatic-power spectacle lens having a cylindrical power to correct astigmatism of an eye comprising:

a front surface; and

a back surface,

wherein at least one of said front and back surface is a rotationally-asymmetrical aspherical surface and wherein when a sag $z(h, \theta)$ of said rotationally-asymmetrical surface at a point (h, θ) with respect to an x-y plane is expressed as a function of the angle θ while fixing the distance h, the curve of said function has a larger gradient in close to the local maximum and a smaller gradient in close to the local minimum as compared with the curve interpolated by the sine curve in any distance h within the range of $10 \le h \le 20$,

where

the z-axis is a normal to said rotationally-asymmetrical surface at a framing reference point that is the origin of the x-y-z coordinate system and is coincident with a pupil position of a user when the spectacle lens is installed on a frame,

the x-axis is coincident with a first principal meridian of said rotationally-asymmetrical surface along which the minimum surface refractive power is obtained,

the y-axis is coincident with a second principal meridian of said rotationally-asymmetrical surface along which the maximum surface refractive power is obtained,

h is a distance from said origin in the x-y plane, and

θ is an angle of the line passing said origin and said point (h, θ) with respect to the x-axis in the x-y plane.

5. A single-vision astigmatic-power spectacle lens having a cylindrical power to correct astigmatism of an eye comprising:

a front surface; and

a back surface,

wherein at least one of said front and back surface is a rotationally-asymmetrical aspherical surface and wherein the following condition (1) is satisfied at any distance h within the range of $10 \leq h \leq 20$.

$z(h,45)<\{f(h)+g(h)\}/2$ ...(1)

where

the z-axis is a normal to said rotationally-asymmetrical surface at a framing reference point that is the origin of the x-y-z coordinate system and is coincident with a framing reference point that is coincident with a pupil position of a user when the spectacle lens is installed on a frame,

the x-axis is coincident with a first principal meridian of said rotationally-asymmetrical surface along which the minimum surface refractive power is obtained,

the y-axis is coincident with a second principal meridian of said rotationally-asymmetrical surface along which the maximum surface refractive power is obtained,

h (unit: mm) is a distance from said origin in the x-y plane,

θ (unit: degree) is an angle of the line passing said origin and said point (h, θ) with respect to the x-axis in the x-y plane,

$z(h, \theta)$ is the sag of said rotationally-asymmetrical surface at a point (h, θ) with respect to the x-y plane.

$f(h)$ is the sag $z(h, 0)$ on the x-axis, and

$g(h)$ is the sag $z(h, 90)$ on the y-axis.

6. The single-vision astigmatic-power spectacle lens according to claim 5, wherein the spherical power is negative and the following condition (2) is satisfied at any distance h within the range $10 \leq h \leq 20$;

$$-0.00010<[z(h,45)-\{f(h)+g(h)\}/2]$$
$$/[\{f(h)-g(h)\}\times h\times CYL]<-0.00008 \quad \ldots(2)$$

where

CYL (unit: Diopter) is a cylindrical power.